ABSTRACT OF THE DISCLOSURE

A processing circuit and method generate signal quality estimates based on scaling measured inter-symbol interference (ISI) in a received signal according to a cancellation metric corresponding to ISI cancellation performance of the receiver. By accounting for ISI cancellation performance of the receiver based on a simple scaling metric, accurate received signal quality measurements are obtained in a manner that accounts for un-cancelled ISI in the received signal without requiring use of potentially complex multipath combining weight calculations in the signal quality calculation. Signal quality estimation results may be used for sending corresponding Channel Quality Indicators, communication link transmit power control commands, etc. In some embodiments, the cancellation metric is maintained as a dynamic value based on measured ISI cancellation performance, while in other embodiments the cancellation metric comprises a pre-configured value stored in memory, for example.